

# FE82

## WIRE DRAG

Diagram No. 1220 & 1000-3

NOAA FORM 76-35A

U.S. DEPARTMENT OF COMMERCE  
NATIONAL OCEANIC AND ATMOSPHERIC ADMINISTRATION  
NATIONAL OCEAN SURVEY

### DESCRIPTIVE REPORT

(HYDROGRAPHIC)

Type of Survey ..... Wire Drag  
Field No. .... PBS-WD-4349  
Office No..... FE-82WD

#### LOCALITY

State ..... Maryland  
General Locality .. Atlantic Ocean  
Locality ..... East of Winter Quarter Shoal

19 49

CHIEF OF PARTY  
G.R. Fish

#### LIBRARY & ARCHIVES

DATE ..... May 17, 1950

☆ U.S. GOV. PRINTING OFFICE: 1976-669-441

NOTE: A new system for registering Field Examinations (FE's) was established in 1980. All FE's are now consecutively numbered as shown hereon. The date shown in the new format is the actual date of survey. This material was previously registered as:

FE No.8 1949

FE82  
WIRE DRAG



# F.E. No. 8 1949 WIRE DRAG

FE-82

*Cut up smooth sheet  
filed in report*

Diag. Cht. No. 1220 & 1000-3

Form 504

U. S. COAST AND GEODETIC SURVEY

DEPARTMENT OF COMMERCE

## DESCRIPTIVE REPORT

Type of Survey WIRE DRAG

Field No. PBS-4349WD Office No. F.E.No.8(1949) W.D.

### LOCALITY

State Maryland

General locality Atlantic Ocean

Locality East of Winter Quarter Shoal

1949

CHIEF OF PARTY

G.R. Fish

LIBRARY & ARCHIVES

DATE 17 May 1950

B-1870-1 (1)

F.E. No. 8  
1949  
WIRE DRAG



DEPARTMENT OF COMMERCE  
U. S. COAST AND GEODETIC SURVEY

REG. NO.

**HYDROGRAPHIC TITLE SHEET**

The Hydrographic Sheet should be accompanied by this form, filled in as completely as possible, when the sheet is forwarded to the Office.

REGISTER No. \_\_\_\_\_

Field No. PBS-4349-WD

State MARYLAND

General locality ATLANTIC OCEAN

Locality EAST OF WINTER QUARTER SHOAL

Scale 1:40,000 Date of survey 12 to 23 June 1949

Instructions dated 5 March 1948 & 8 April 1949

Vessel PARKER, BOWEN, & STIRNI

Chief of party G. R. Fish

Surveyed by G. R. Fish

Soundings taken by ~~echo sounder~~ hand level, graphic recorder, ~~hand level~~

Protracted by STANLEY M. TARKENTON

Soundings penciled by " " "

Soundings in ~~unknown~~ feet at MLW ~~MLW~~

REMARKS: 1



DESCRIPTIVE REPORT  
TO ACCOMPANY

WIRE DRAG SURVEY NO. F.E. No. 8, 1949 (PBS - 4349 - WD)

SHIPS PARKER, BOWEN, & STIRNI

G. R. Fish, LCDR  
Chief of Party

AUTHORITY

This survey was executed in compliance with Supplemental Instructions for Project CS-226, dated 5 March 1948 and 8 April 1949. ✓

DATE OF SURVEY

Wire drag operations were between 12 and 23 June 1949. There are no floating aids to navigation on this sheet. ✓

SCOPE

This survey was made in order to locate and determine the least depths over Items Nos. 12, 13, 14, & 15 of Supplemental Instructions dated 8 April 1949. ✓

CONTROL

Shoran distances from two shoran stations were used as control for all work on this sheet. Station TEA was on triangulation station Assateague Lighthouse (Va.) 1909, 1912, and station WAT was on triangulation station Water Tank (Md.) 1932, 1942. At station WAT the antenna was fastened to the walkway railing and moved as necessary. A point 5 meters east of the triangulation station is a good mean position for the antenna. The antenna at TEA was about 150 feet above sea level and the antenna at WAT was about 100 feet above sea level. ✓

Before beginning field work the shoran sets were calibrated in Chesapeake Bay. Corrections have been applied to the observed readings to make the zero settings agree with the calibrated values. ✓

SURVEY METHODS

Standard dual control methods were used. Azimuths to NEAR and FAR buoys were determined by azimuth circles on gyro repeaters mounted on top of the pilot houses. ✓

Standard 100 foot lengths of ground wire were used for the towline and the distance from the shoran mast to the end of the bridle was added to determine the total length of the towline. The distance from the shoran mast to the end of the bridle was about 60 feet. The following entries were made for length of towline: ✓



Length of Ground Wire  
Used in Feet

Length of Towline  
Entered in Meters

300	120
400	150
500	180
600	210
700	240
800	270

Tests for lift were made by the Tender using a graduated lead-filled pipe, 3/4" x 10 feet long, attached to a graduated airplane cord. This line was attached to a small buoy reel mounted on a small float. The pipe was coated with a mixture of white lead and oil to accurately determine the point of contact with the ground wire. Tests for lift were taken as soon as the drag was towing smoothly and repeated as thought necessary to take care of changing conditions.

Due to the height of the freeboard on the tender it was not feasible to reset the uprights after the drag was in the water. Due to this factor it was some times necessary to tow the drag along the bottom in the shoaler water in order to have sufficient depth of drag in the deeper water. Very little trouble was had when the ends of the drag were aground but it is difficult to tow the middle of the drag up more than a moderate slope.

The Ship PARKER was used as the guide vessel, the Ship BOWEN as the end vessel, and the Ship STIRNI as the tender.

FIELD OPERATIONS

As indicated on the obstruction data sheet three of the four wrecks were found. It is recommended that the position obtained by the Guide and End vessels when picking up the drag be given precedence in determining the correct location of the wrecks.

Long drags to cover the area with the minimum number of steps, were set to effective depths to clear the charted depths as shown on charts Nos. 1109 and 1220. Due to the uneven bottom the drag was grounded at times. The strip was continued by pulling the drag along the bottom unless a definite hang was indicated.

RECORDS

Drag settings were based on predicted tides for Sandy Hook, New Jersey, corrected for time and height as applied to the area. Actual tides used in the completion of the smooth records were based on the tides from Sandy Hook and Lewes, Delaware, and were furnished this party by the Washington office. All references to effective depths, unless otherwise specified, are those indicated in the record books.



Tide reducers and lifts have been entered to the nearest 0.5 foot and checked. Drag strip diagrams showing the effective depth in integral feet have been drawn and checked in the record books.

#### TIDES

Tide gages were not maintained by this party. Tides from the Sandy Hook, New Jersey, and Lewes, Delaware, tide gages were furnished by the Washington office and used to process the records.

#### OBSTRUCTIONS, CLEARANCES, DISCREPANCIES, ETC.

Special reports for each wreck were submitted to the Director during the progress of this survey and copies of these reports were forwarded to the Supervisor, Southeastern District. Copies of these reports are attached hereto and become a part of this report. An obstruction data sheet showing the minimum hang and maximum clearance and based on the final corrections is included in this report and these values take precedence over the values listed in the special reports.

#### RECOMMENDATIONS

It is recommended that work on these four wrecks covered by this report be classified as completed.

*Raymond H. Tryon, Jr.*

Raymond H. Tryon, Jr.

Lt. Comdr., USC&GS

Comdg. Ships PARKER, BOWEN, & STIRNI



# OBSTRUCTION DATA SHEET

Survey No. 4349, WD

LOCATION	GENERAL DEPTH FEET	MINIMUM HANG FEET	POSITION NUMBER	MAXIMUM CLEARANCE FEET	POSITION NUMBER	CHARACTER OF OBSTRUCTION	REMARKS
Lat. 38°-06'-06" Long. 74°-37'-00"	--	--	--	91 94-93 94-93	1-24D 1-27F 28-51F	Wreck No. 253	Not found ✓
Lat. 38°-13' + <sup>785</sup> <del>760</del> meters Long. 74°-45' + 640 meters	91	76 ✓	35.2C	72 ✓	1-8E	Wreck No. 818	✓
Lat. 38°-13' + <sup>650</sup> <del>664</del> meters Long. 74°-45' + 1120 meters	84	64* ✓ 67**	34.4E 44.8E	62 ✓	26-31E	Wreck No. 819	✓
Lat. 38°-05' + 890 meters Long. 74°-48' + <sup>1020</sup> <del>1120</del> meters	83	51 ✓	27.4A	50 ✓	1-7G	Wreck No. } Barge Gordon C. Cole Par. 12	

\* See note Paragraph 4 Special report of 23 June 1949 } copy attached

\*\* See note Paragraph 3 Special report of 23 June 1949 }



STATISTICS FOR SHEET NO. \_\_\_\_\_ (PBS-WD-4349)  
 Ships PARKER, BOWEN, STIRNI (Project CS-326)

<u>Date</u>	<u>Day Letter</u>	<u>Stat. Mi. Dragged</u>	<u>Number Positions</u>	<u>No. H.L.</u>	<u>Soundings Fath.</u>
12 June	A	4.3	36	--	2
13 "	B	5.4	50	--	--
14 "	C	4.0	39	--	4
15 "	D	3.5	24	--	--
21 "	E	4.9	47	--	--
22 "	F	6.7	51	--	--
23 "	G	0.9	7	--	--
Totals		29.7	254	--	6

Total square statute miles of area dragged equal 19.7



*Bowen*

418 Post Office Building, Norfolk, Virginia

23 June 1949

To: The Director  
U. S. Coast & Geodetic Survey  
Washington 25, D. C.

Subject: Special Report on Wreck of the Barge GORDON C. COLE. — superseded by  
Obstruction Data Sheet

This wreck is Item No. 12 of Supplemental Instructions dated  
8 April 1949.

The position of the wreck of the Barge GORDON C. COLE is

Latitude  $38^{\circ} 05.47'$   
Longitude  $74^{\circ} 48.68'$

A wire drag set to an effective depth of 51.0 feet hung the  
wreck.

A wire drag set to an effective depth of 50.5 feet cleared  
the wreck.

Depths are based on predicted tides for the vicinity.

Recommended charting depth is 50 feet.

O. R. Fish  
Lt. Comdr., USCGC  
Comdg. Ships PARKER, BOWEN, STIRRI

cc: Supervisor, SE District

*f 485(49)*



418 Post Office Building, Norfolk, Virginia

23 June 1949

To: The Director  
U. S. Coast & Geodetic Survey  
Washington 25, D. C.

Subject: Special Report on Wreck No. 253 (SAN GIL) — *Superseded by Obstruction Data Sheet*

This wreck is Item No. 13 of Supplemental Instructions dated 8 April 1948.

The wreck was not found. An area about 2.8 miles long in a north-south direction and about 2.5 miles wide in an east-west direction and centered on the reported position of the wreck in latitude 38° 08' 00", longitude 74° 37' 00" was cleared by wire drag with effective depths varying from 91.0 to 93.5 feet.

After completing the wire drag a sonar search was made around the limits of the area covered by wire drag with negative results.

Depths are based on predicted tides for the vicinity.

It is recommended that no further search be made for this wreck and that the wreck symbol be retained on the chart and that the area covered by wire drag also be shown.

*No. See review*

C. R. Fish  
Lt. Comdr., USCGC  
Comdg. Ships PARKER, BOWEN, STIRRI

cc: Supervisor, SE District

2485 (49)



418 Post Office Building, Norfolk, Virginia

25 June 1949

To: The Director  
U. S. Coast & Geodetic Survey  
Washington 25, D. C.

Subject: Special Report on Wreck No. 818 (S. G. WILSON) — *Superseded by Obstruction Data Sheet*

This wreck is Item No. 14 of Supplemental Instructions dated 8 April 1949.

The position of Wreck No. 818 is

Latitude 38° 13.37'  
Longitude 74° 45.38'

A wire drag set to an effective depth of 76.5 feet hung the wreck.

A wire drag set to an effective depth of 72.5 feet cleared the wreck.

Depths are based on predicted tides for the vicinity.

Recommended charting depth is 72 feet.

G. R. Fish  
Lt. Comdr., USCGC  
Comdg. Ships PARKER, BOWEN, STIRRI

cc: Supervisor, SE District

2485(49)



Bowen

418 Post Office Building, Norfolk, Virginia

23 June 1949

To: The Director  
U. S. Coast & Geodetic Survey  
Washington 25, D. C.

Subject: Special Report on Wreck No. 819 (SAITIA) - *Superseded by Obstruction Data Sheet*

This wreck is Item No. 15 of Supplemental Instructions dated 8 April 1949.

The position of Wreck No. 819 is

Latitude 38° 13.37'  
Longitude 74° 45.76'

A wire drag set to an effective depth of 60.5 feet hung and cleared the wreck.

A wire drag set to an effective depth of 64.5 feet cleared the wreck but the current carried the drag close to the wreck before tension was put on the ground wire and the clearance is doubtful.

A wire drag set to an effective depth of 63.0 feet cleared the wreck.

Depths are based on predicted tides for the vicinity.

Recommended charting depth is 63 feet.

G. R. Fish  
Lt. Comdr., USCGC  
Comdg. Ships PARKER, BOWEN, STIRNI

cc: Supervisor, SE District

485(49)



ADDENDUM

To Accompany

WIRE DRAG SURVEY PBS-4349WD

This survey was treated as a field examination in accordance with The Directors' letter, number 22-sro, D-1-SE, dated 10 Oct. 1949.

DISCREPANCIES

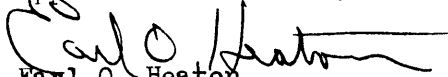
Lat. 38-14.5' Long. 74-44.4 Ground on charted shoal  
at 74 feet on line 30 to 50B was cleared at 79 feet on line 1 to 30B.  
part of strip rejected

Respectfull submitted,

  
Hugh L. Proffitt  
Cartographer

Norfolk, Va.  
8 May 1950

Approved & Forwarded;

  
Earl O. Heaton  
Supervisor, S.E. District.



RK

## TIDE NOTE FOR HYDROGRAPHIC SHEET

~~Division of Hydrography and Topography~~

24 May 1950

Division of Charts: R. H. Carstens

Plane of reference approved in

5 volumes of sounding ~~records~~ and wire drag records for  
FE No. 8 1949

~~HYDROGRAPHIC SHEET~~

Locality East of Winter Quarter Shoal, Virginia Coast

Chief of Party: G. R. Fish in 1949

Plane of reference is mean low water, reading

2.0 ft. on tide staff at Sandy Hook, New Jersey

9.3 ft. below B. M. 2 (1923)

2.0 ft. on tide staff at Lewes, Delaware

13.3 ft. below B. M. 36 (1947)

Height of mean high water above plane of reference is as follows:

Sandy Hook = 4.6 feet

Lewes = 4.2 feet

Condition of records satisfactory except as noted below:

E. C. McKay

Section

Chief, ~~Division of Tides and Currents~~

# Hydrographic Surveys (Chart Division)

HYDROGRAPHIC SURVEY NO. .F.E.No.8(1949) W.D.

## Records accompanying survey:

Boat sheets 2....; sounding vols. 1....; wire drag vols. 4....;  
bomb vols. ....; graphic recorder rolls ....;  
special reports, etc. 1 envel., drag strip tracings.....  
.....

The following statistics will be submitted with the cartographer's report on the sheet:

Number of positions on sheet	.....	254	254
Number of positions checked	.....	17	17
Number of positions revised	.....	1	1
Number of soundings revised (refers to depth only)	.....		
Number of soundings erroneously spaced	.....		
Number of signals erroneously plotted or transferred	.....		
Topographic details	Time	.....	
Junctions	Time	.....	
Verification of soundings from graphic record	Time	.....	
Verification by.....	Total time	8 hrs.	Date 20 Oct. '50
Reviewed by.....	Time	4 hrs.	Date 17 Nov '50



REVIEW OF FIELD EXAMINATION NO. 8, 1949

This field examination was made to investigate four sunken wrecks off the Maryland coast, falling within the limits of Charts 1220 and 1109. Shoran was used for control.

Three of the wrecks were found. No evidence of Wreck No. 253 (Chart 1109) was found within more than a one-mile radius of the reported position. Additional search by Sonar failed to detect the wreck.

The results of the wire-drag examination are tabulated on the obstruction data sheet in the Descriptive Report and plotted on the attached three sections of the smooth sheet.

This work was applied to Chart 1220 (print of 50-10/16) before verification; the charted detail is correct. The sunken wreck symbol, Wreck No. 253 in lat.  $38^{\circ} 06.1'$ , long.  $74^{\circ} 37.0'$ , should be expunged from Chart 1109; the area was cleared to within 1 fathom of the charted 16-fm. bottom depth.

The Descriptive Report and attached correspondence adequately cover all other matters pertaining to this examination.

November 17, 1950

G. F. Jordan

Inspected by: R. H. Carstens



18

40 TEA

S.G. Wilbur

79

WRECK 818  
Cleared by 72 ft.

14'

74

78

WRECK 819  
Cleared by 62 ft.

62

64

67

72

75

74

81

80

Note: The effective depth of the drag  
is omitted where the drag was on  
the bottom

38°12'

20

F. E. No. 8, 1949

Scale- 1:40,000

Sheet 1 of 3

48'

46'

22 WAT

74°44'



2

20 WAT

WRECK "GORDON C. COLE"  
Cleared by 50 ft.

38°06'

22

30 TEA

75

74

32

04'

24

F. E. No. 8, 1949

Scale-1:40,000

Sheet 2 of 3

Note: The effective depth is omitted  
where the drag was on the bottom

26

52'

74°50'

48'



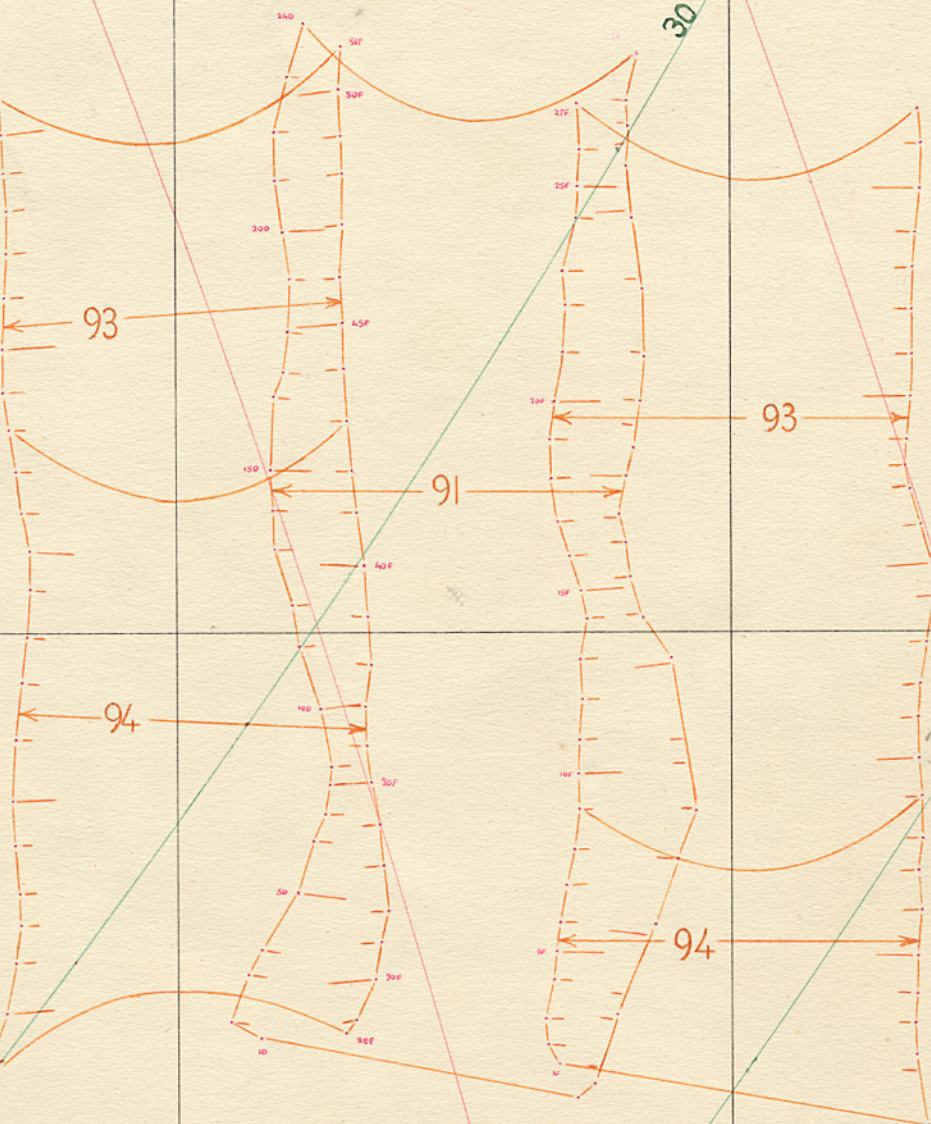
WRECK No 253

38°08'

28 WAT

44 TEA

30



F. E. No. 8, 1949  
Scale- 1:40,000  
Sheet 3 of 3

06'

32

04'

42

40'

74°38'

36'



# NAUTICAL CHARTS BRANCH

SURVEY NO. F.E.No.8(1949) W.D.

## Record of Application to Charts

[illegible]

M-2168-1

**A basic hydrographic or topographic survey supersedes all information of like nature on the uncorrected chart. Give reasons for deviations, if any, from recommendations made under "Comparison with Charts" in the Review.**